

46/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0015361453 - Drawing available

WPI ACC NO: 2005-711721/200573

XRPX Acc No: N2005-584408

High-resolution image generating method involves replacing low frequency primitives of low-resolution image with corresponding primitives from prestored training data

Patent Assignee: MICROSOFT CORP (MICT)

Inventor: SHUM H ; SUN J ; TAO H

Patent Family (1 patents, 1 countries)

Patent

Application

Number	Kind	Date	Number	Kind	Date	Update
US 20050220355	A1	20051006	US 2004817471	A	20040401	200573 B

Priority Applications (no., kind, date): US 2004817471 A 20040401

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 20050220355	A1	EN	16	22	

High-resolution image generating method involves replacing low frequency primitives of low-resolution image with corresponding primitives from prestored training data

Original Titles:

Generic image hallucination

Inventor: SHUM H ...

... SUN J

Alerting Abstract ...NOVELTY - Multiple low frequency primitives are extracted from a low-resolution image and replaced with corresponding primitives using primal sketch priors of prestored training data to provide

...computer readable medium storing high-resolution image generating program; high resolution image generating system; and high resolution image generating apparatus...

...USE - For digital image processing...

...ADVANTAGE - Enables to generate high-resolution image with smooth contour from any generic low-resolution image.

...DESCRIPTION OF DRAWINGS - The figure shows the sample bird image obtained by the generic image hallucination process.

Title Terms.../Index Terms/Additional Words: IMAGE ;

Original Publication Data by Authority

Inventor name & address:

Sun, Jian ...

... Shum, Heung-Yeung ...

... Tao, Hai

Sylvia Keys

11-Jan-07 04:25 PM

44/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0013974138 - Drawing available
WPI ACC NO: 2004-154987/200415
XRPX Acc No: N2004-123916

**Visual image rendering method in display unit of computing device,
involves receiving samples with respect to textured surface, in each bin of
frame buffer and assigning specific range to each received sample**

Patent Assignee: SNYDER J M (SNYD-I); MICROSOFT CORP (MICT)

Inventor: SNYDER J M

Patent Family (2 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 20040001645	A1	20040101	US 2002186990	A	20020628	200415 B
US 7120311	B2	20061010	US 2002186990	A	20020628	200667 E

Priority Applications (no., kind, date): US 2002186990 A 20020628

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 20040001645	A1	EN	39	9	

**Visual image rendering method in display unit of computing device,
involves receiving samples with respect to textured...**

Alerting Abstract ...operating system, driver code, application programming interface, tool kit and coprocessing device for **image** rendering; modulated data signal comprising computer executable instruction for **image** rendering; computing device for **image** rendering; **image** rendering system; and computer readable medium for storing **image** rendering program...

...USE - For rendering display contents such as graphical objects, color or **image** data, in display unit of computing device (claimed) e.g. personal digital assistant (PDA), television...

...DESCRIPTION OF DRAWINGS - The figure shows a flowchart explaining variable rate source sampling, accumulation and **image** rendering processes.

Title Terms.../Index Terms/Additional Words: IMAGE ;

Class Codes

International Classification (+ Attributes)
IPC + Level Value Position Status Version
... G06K-0009/36

Original Publication Data by Authority

Original Abstracts:

...well compared to prior architectures in areas that have higher frequency content, solving the minification **antialiasing** problem and producing a high quality result. A filter determines the value(s) to assign...

...conventional forward-mapping techniques are thus eliminated more simply by oversampling the source(s), and **interpolated** points are generated at a higher rate than the original source signal(s) to adequately...

...buffer visibility in the destination bins is addressed in an efficacious manner.. A variety of **image** processing applications are contemplated wherein forward mapping, and accumulation and resolution of forward mapped point samples can be applied, ranging from 4-D graphics applications to applications wherein **images** recorded in a recording/storage environment are mapped to the arbitrary requirements of a display...

44/3,K/2 (Item 2 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0012911132 - Drawing available
WPI ACC NO: 2002-407177/200244
XRPX Acc No: N2002-319753

Smooth depiction of two or three dimensional data sets using curvature minimizing displacement of pixel values particularly of use in building 3D medical images from 2D image records

Patent Assignee: BRAINLAB AG (BRAI-N); HUTTER M (HUTT-I)
Inventor: HUTTER M

Patent Family (6 patents, 25 countries)

Patent				Application			
Number	Kind	Date	Number	Kind	Date	Update	
EP 1184812	A1	20020306	EP 2000118236	A	20000901	200244	B
US 20020041701	A1	20020411	US 2001859975	A	20010517	200244	E
EP 1184812	B1	20020731	EP 2000118236	A	20000901	200257	E
DE 50000345	G	20020905	DE 50000345	A	20000901	200266	E
			EP 2000118236	A	20000901		
ES 2180492	T3	20030216	EP 2000118236	A	20000901	200321	E
US 6879714	B2	20050412	US 2001859975	A	20010517	200525	E

Priority Applications (no., kind, date): EP 2000118236 A 20000901

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing	Notes
EP 1184812	A1	DE	18	9		
Regional Designated States,Original: AL AT BE CH CY DE DK ES FI FR GB GR						
IE IT LI LT LU LV MC MK NL PT RO SE SI						
EP 1184812	B1	DE				
Regional Designated States,Original: AL AT BE CH CY DE DK ES FI FR GB GR						
IE IT LI LT LU LV MC MK NL PT RO SE SI						
DE 50000345	G	DE			Application	EP 2000118236
					Based on OPI patent	EP 1184812
ES 2180492	T3	ES			Application	EP 2000118236
					Based on OPI patent	EP 1184812

...sets using curvature minimizing displacement of pixel values particularly of use in building 3D medical images from 2D image records

Original Titles:

... Antialiasing representation of two- or three-dimensional data sets through curvature minimizing shift of pixel values...

... Antialiasing representation of two- or three-dimensional data sets through curvature minimizing shift of pixel values

Alerting Abstract ...NOVELTY - Method for producing a 2D **image** from a 2D output data record that defines a color or gray value distribution in...

...rectangles that are divided into triangles, the inner area of the

triangle is colored by **interpolation** between the corner points to obtain a continuous data model, by displacement of the corner...

...the curvature of the surfaces is minimized and from the displaced continuous data an orthogonal **image** is produced....of 2D data sets for description of a 3D object and a computer program for **image** processing according to the above methods...

...USE - Smoothing of two and three-dimensional graphical **images** by minimization of curvature using pixel displacement to improve **image** appearance. The invention relates to production of three-dimensional **images** from 2D **images**, e.g. medical **images** obtained using ultrasound, computer tomography, NMR, etc...

...DESCRIPTION OF DRAWINGS - Figure shows an output **image** interpolated with existing technology and analyzed according to the inventive method.

Title Terms.../Index Terms/Additional Words: **IMAGE** ;

Class Codes

International Classification (Main): G06K-009/00 ...

Original Publication Data by Authority

Original Abstracts:

...an beliebigen Zwischenwerten im Inneren der Dreiecke bzw. Tetraeder können nun z. B. durch lineare **Interpolation** gewonnen werden. Die Glattung der Bildkanten erfolgt durch Verschiebung der Stützstellen um bevorzugt nicht mehr...

...relates to a method of smoothing the staircasing which results from discretisation in two-dimensional **images**, or in a series of two-dimensional **images** forming a three-dimensional data set. To start with, a first two- or three-dimensional continuum data model of the **images** is generated in which adjacent or juxtaposed pixels form squares or cubes respectively which are...

...The corner points are assigned the chromatic or monochrome values of the pixels in the **image**. Chromatic or monochrome values at any intermediate values in the interior of the triangles or tetrahedrons can then be obtained, e.g. by linear **interpolation**. Smoothing the edges of the **image** is done by shifting the supporting points, preferably by not more than half a pixel...

...such that the curvature as a whole is reduced or minimised, after which the resulting **image** no longer exhibits the staircase lines of the original **image**. By relatively simple means, the continuum model thus achieved by using a plurality of now...

...permits conversion of the resulting data set back into a regular, for example orthogonal, pixel **image**. It is likewise possible to extract two-dimensional triangulated surfaces of objects, in a given chromatic or monochrome value range, from the three-dimensional data set or to generate slice **images** in any desired planes not located in an imaging plane...

...relates to a method of smoothing the staircasing which results from discretisation in two-dimensional **images**, or in a series of two-dimensional **images** forming a three-dimensional data set. To start with, a first two- or three-dimensional continuum data model of the **images** is generated in which adjacent or juxtaposed pixels form squares or cubes

particularly orthogonal, image is generated from the shifted continuum data model...

...What is claimed is:1. A method for generating a two-dimensional image from a two-dimensional original set of data...

...rectangles, which are sub-divided into triangles;b) chromatic or monochrome values are assigned to the interior portion of the triangles by interpolating the chromatic or monochrome values at the corner...
...defined by the chromatic or monochrome value distribution, thereby shifting the continuum data model correspondingly; and d) a two-dimensional, more particularly orthogonal, image is generated from the shifted continuum data

44/3,K/3 (Item 3 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0012745837 - Drawing available
WPI ACC NO: 2002-598697/
XRPX Acc No: N2002-474851

Resolution conversion method for display device, involves producing enhanced pixel tile information by matching template with determined pixel-wise looseness values

Patent Assignee: XEROX CORP (XERO)
Inventor: CUCIUREAN-ZAPAN C; HANDLEY J C; LOCE R P
Patent Family (2 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 20020076120	A1	20020620	US 2000740607	A	20001219	200264 B
US 6757431	B2	20040629	US 2000740607	A	20001219	200443 E

Priority Applications (no., kind, date): US 2000740607 A 20001219

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 20020076120	A1	EN	22	11	

Original Titles:

Resolution conversion for anti - aliased images using loose gray scale template matching...

...Resolution conversion for anti - aliased images using loose gray scale template matching

Alerting Abstract ...NOVELTY - An image data comprising bit map data of several gray scale pixel tiles received at a suitable resolution. Several templates are applied on a pixel tile information extracted from the image at different resolution based on which a pixel-wise looseness intervals defining difference between the...

USE - For resolution conversion using image processing filters or for scanner, camera, printer, display device, etc...

...ADVANTAGE - Reduces bandwidth costs and interpolating costs does not limit the threshold looseness interval to be symmetric about a central value...

Class Codes

International Classification (Main): G06K-009/62 ...

(Additional/Secondary): G06K-009/40 ...

... G06K-009/64 ...

... G06K-009/68

Original Publication Data by Authority

Original Abstracts:

A method for resolution conversion for re-sampling **anti - aliased images** is disclosed which decreases bandwidth costs associated with **anti - aliased** line art and other costs associated with **interpolating** these **images** to a desired resolution. The present method first involving the receipt of an **image** which is comprised of bitmap data including at least a plurality of gray-scale pixel tiles that define the **image**. Then receiving the **image** data at a first resolution and extracting pixel tile information of the received **image** at a second resolution. The method has the step of next using loose gray scale...

...integer values and the first and second resolutions have a non-integer ratio. The input **image** can also preferably be comprised of gray halftones and the output enhanced pixel tile can...

...A method for resolution conversion for re-sampling **anti - aliased images** is disclosed which decreases bandwidth costs associated with **anti - aliased** line art and other costs associated with **interpolating** these **images** to a desired resolution. The present method first involving the receipt of an **image** which is comprised of bitmap data including at least a plurality of gray-scale pixel tiles that define the **image**. Then receiving the **image** data at a first resolution and extracting pixel tile information of the received **image** at a second resolution. The method has the step of next using loose gray scale...

...integer values and the first and second resolutions have a non-integer ratio. The input **image** can also preferably be comprised of gray halftones and the output enhanced pixel tile can...

Claims:

What is claimed is: **1**. A method for resolution conversion for re-sampling **anti - aliased images** from an **image** source in order to decrease bandwidth costs associated with **anti - aliased** line art and associated with **interpolating** said **images** to a desired resolution, comprising the steps of: receiving said **image** comprised of bitmap data including at least a plurality of gray-scale pixel tiles that define said **image**; receiving said **image** data at a first resolution; extracting pixel tile information of the received **image** wherein the pixel tile information is at a second resolution; using loose gray scale template...

...What is claimed is: 1. A method for resolution conversion for re-sampling **anti - aliased images** from an **image** source in order to decrease bandwidth costs associated with **anti - aliased** line art and associated with **interpolating** said **images** to a desired resolution, comprising: (a) receiving an **image** comprised of bitmap of **image** data, the **image** data being at a first resolution; (b) generating a first two-dimensional window, the first two-dimensional window having a plurality **image** data values, each **image** data value being associated with a pixel location in the first two-dimensional window; (c...

...which template of the plurality of templates loosely matches the first

two-dimensional window of **image** data values, the loosely matched template being a template wherein the determined looseness interval associated...

...and (g) generating, based on the template loosely matched the first two-dimensional window of **image** data values, a second two-dimensional window of **image** data values, the second two-dimensional window of **image** data values having a second resolution, the first resolution being different from the second resolution.

44/3,K/4 (Item 4 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0010927972

WPI ACC NO: 2001-549963/

XRPX Acc No: N2001-408548

Rapid smoothing of object edges in computer graphics by simultaneously performing a texture filtering procedure to enable text and edge anti - aliasing

Patent Assignee: CHANNEL STORM LTD (CHAN-N); FRIEDMAN M M (FRIE-I)

Inventor: TAVOR A

Patent Family (2 patents, 92 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
WO 2001056268	A1	20010802	WO 2001US2794	A	20010129	200161 B
AU 200131212	A	20010807	AU 200131212	A	20010129	200174 E

Priority Applications (no., kind, date): US 2000491871 A 20000127

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
WO 2001056268	A1	EN	27	7	

National Designated States, Original: AE AG AL AM AT AU AZ BA BB BG BR BY BZ CA CH CN CR CU CZ DE DK DM DZ EE ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NO NZ PL PT RO RU SD SE SG SI SK SL TJ TM TR TT TZ UA UG US UZ VN YU ZA ZW

Regional Designated States, Original: AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW MZ NL OA PT SD SE SL SZ TR TZ UG ZW
AU 200131212 A EN Based on OPI patent WO 2001056268

...in computer graphics by simultaneously performing a texture filtering procedure to enable text and edge anti - aliasing

Alerting Abstract ...NOVELTY - An original **image** is enhanced by the addition of an extra row or column of pixels at each side of the **image** and the color value of the extra pixels is copied from the nearest neighboring pixels of the original **image**, while the value of the alpha component for the extra pixels is set to total transparency and the alpha component of pixels of the original **image** is set to full opacity. The texture filtering is performed when the enhanced **image** is transferred....
ADVANTAGE - Eliminating jagged edges from **images**.

Class Codes

(Additional/Secondary): G06K-009/36 ...

Original Publication Data by Authority

Original Abstracts:

A method for rapidly performing an edge **anti - aliasing** procedure on a computer graphic **image** , by simultaneously performing a texture filtering procedure, thereby enabling both texture **anti - aliasing** and edge **anti - aliasing** to be performed. According to a first embodiment, the value of the alpha component is calculated for each pixel individually in order to performed the edge **anti - aliasing** method (Fig.1). According to preferred embodiments, an extra row or column of pixels is drawn on each side of the **image** with their alpha component set to total transparency, but with the same color value as the nearest pixels of the original **image** (Fig.5), to form an enhanced **image** . If the original pixels of the **image** had no alpha values, then these alpha values are set to full opacity. When the enhanced **image** is transformed, for example by being rotated and slanted, texture filtering is then performed, for example by linear **interpolation** (Fig.6...

...un procede permettant de mettre en oeuvre une procedure d'anticrenelage des bords sur une **image** infographique, consistant a effectuer simultanement une amelioration de la texture par filtrage, ce qui permet...

...une rangee ou une colonne de pixels supplementaire est ajoutee de chaque cote de l' **image** , ses composantes alpha etant traitees en transparence totale, mais avec la meme luminosite de couleur que celle des pixels les plus proches de l' **image** originale (Fig. 5), afin de former une **image** amelioree. Si les pixels originaux de l' **image** n'ont pas de valeurs alpha, alors ces valeurs alpha sont traitees en opacite totale. Lorsque l' **image** amelioree est transformee, par rotation ou par inclinaison, une amelioration de la texture par filtrage est effectuee, par **interpolation** lineaire par exemple (Fig. 6).

44/3,K/5 (Item 5 from file: 350)

DIALOG(R)File 350:Derwent WPIX

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0009751176 - Drawing available

WPI ACC NO: 2000-037340/200003

XRFX Acc No: N2000-028020

Texture edge anti - aliasing method for computer graphics

Patent Assignee: SILICON GRAPHICS INC (SILI-N)

Inventor: VAN HOOK T J

Patent Family (1 patents, 1 countries)

Patent		Application				
Number	Kind	Date	Number	Kind	Date	Update
US 5982939	A	19991109	US 1995472216	A	19950607	200003 B
			US 1997971977	A	19971117	

Priority Applications (no., kind, date): US 1995472216 A 19950607; US 1997971977 A 19971117

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 5982939	A	EN	10	8	Continuation of application US 1995472216

Texture edge anti - aliasing method for computer graphics

Alerting Abstract ...projected texture edge. The nearest texels of a texture are identified and alpha values are **interpolated** to determine an alpha value of the mapped pixel. The new opacity value is assigned...
...An INDEPENDENT CLAIM is included for a system for reducing blurring of

edges in an image .

...

...USE - For anti - aliasing of computer graphics...

...ADVANTAGE - Enables generating magnified image having an anti - aliased , single pixel wide projected texture edge

Class Codes

International Classification (Main): G06K-009/36

Original Publication Data by Authority

Original Abstracts:

A system and method of antialiasing edges of a texture that is being projected onto a polygon surface are described. The...

44/3,K/6 (Item 6 from file: 350)

DIALOG(R)File 350:Derwent WPIX

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0006086472 - Drawing available

WPI ACC NO: 1992-325699/199240

XRFX Acc No: N1992-248957

Video image mapping system for live special effects - has weighting coefficient generator and two-dimensional re-sampling filter operating fast enough to process image without artifacts through temporal interpolation

Patent Assignee: GRASS VALLEY GROUP INC (GRAV)

Inventor: BLACKHAM R C; LAWRENCE F S

Patent Family (6 patents, 4 countries)

Patent

Application

Number	Kind	Date	Number	Kind	Date	Update
EP 506429	A2	19920930	EP 1992302669	A	19920326	199240 B
US 5173948	A	19921222	US 1991677548	A	19910329	199302 E
JP 6062312	A	19940304	JP 1992100589	A	19920326	199414 E
EP 506429	A3	19950208	EP 1992302669	A	19920326	199540 E
EP 506429	B1	19990113	EP 1992302669	A	19920326	199907 E
DE 69228139	E	19990225	DE 69228139	A	19920326	199914 E
			EP 1992302669	A	19920326	

Priority Applications (no., kind, date): US 1991677548 A 19910329

Patent Details

Number Kind Lan Pg Dwg Filing Notes

EP 506429 A2 EN 36 12

Regional Designated States,Original: DE ES FR GB

US 5173948 A EN 28 12

EP 506429 A3 EN

EP 506429 B1 EN

Regional Designated States,Original: DE ES FR GB

DE 69228139 E DE Application EP 1992302669

Based on OPI patent EP 506429

Video image mapping system for live special effects...

...has weighting coefficient generator and two-dimensional re-sampling filter operating fast enough to process image without artifacts through temporal interpolation

Original Titles:

...Video **image** mapping system...
...Système de mappage d' **images** video...
...Video **image** mapping system...
...Système de mappage d' **images** video...
...VIDEO **IMAGE** MAPPING DEVICE...
...Video **image** mapping system

Alerting Abstract ...The system maps addresses (10) of the video **image** in the first two-dimensional plane into the second plane to produce quadrilateral addresses. An...

...in the second plane. The video data and addresses are organised to produce a video **image** .

...

...ADVANTAGE - Can accommodate nonlinear and many-to-one mappings, allowing source two-dimensional video **image** to be folded over itself in complicated warp to produce **image** in target co-ordinate system.

Equivalent Alerting Abstract ...resampling filter that efficiently utilise memory resources and operate fast enough to process a video **image** stream without introducing artifacts through temporal **interpolation** .

...

...can accommodate non-linear and many-to-one mappings, allowing a source two-dimensional video **image** to be folded over itself in complicated ways to produce an **image** in the target coordinate system. The only restrictions are that the mapping be piecewise continuous and single-valued. **Anti - aliasing** filtering is implicit in the approach

Title Terms.../Index Terms/Additional Words: **IMAGE** ; ...

... **INTERPOLATION**

Class Codes

...International Classification (Main): G06K-009/32

Original Publication Data by Authority

Original Abstracts:

...filter (16) that efficiently utilize memory resources and operate fast enough to process a video **image** stream without introducing artifacts through temporal **interpolation** . This system can accommodate non-linear and many-to-one mappings, allowing a source two-dimensional video **image** to be folded over itself in complicated ways to produce an **image** in the target coordinate system. The only restrictions are that the mapping be piecewise continuous and single-valued. **Anti - aliasing** filtering is implicit in the approach...

...resampling filter that efficiently utilize memory resources and operate fast enough to process a video **image** stream without introducing artifacts through temporal **interpolation** . This system can accommodate non-linear and many-to-one mappings, allowing a source two-dimensional video **image**

File 344:Chinese Patents Abs Jan 1985-2006/Jan
(c) 2006 European Patent Office
File 347:JAPIO Dec 1976-2006/Sep(Updated 061230)
(c) 2007 JPO & JAPIO
File 350:Derwent WPIX 1963-2006/UD=200703
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Set	Items	Description
S1	1906778	(IMAGE?? OR PHOTO?? OR PHOTOGRAPH??)
S2	193	S1(3N)SKETCH??
S3	81	(PRIMITIVE?? OR PRIMAL) (3N)LAYER??
S4	1996	(DOWN OR DOWNED) (3N)SAMPL?
S5	30574	(EDGE?? OR CONTOUR??? OR RIDGE??) (5N) (ENHANC? OR ADJUST? OR CORRECT? OR RECONSTRUCT? OR IMPROVE?? OR IMPROVING OR RESTOR? OR REPLAC?)
S6	1271	ANTI()ALIAS? OR ANTIALIAS?
S7	36893	INTERPOLAT?
S8	307	HALLUCINAT?
S9	48	MAXIMUM()POSTERIOR?
S10	46	BANK() FILTER???
S11	2342	AU=(SUN, J? OR SUN J? OR SHUM H? OR SHUM H? OR TAO, H?) OR JIAN(2N)SUN OR HEUNG(2N)SHUM OR HAI(2N)TAO
S12	5304	S1 AND S5
S13	30	S12 AND S6
S14	1	S13 AND S7
S15	0	S12 AND S8
S16	0	S12 AND S9
S17	0	S12 AND S10
S18	238	S12 AND S7
S19	0	S18 AND S8
S20	0	S18 AND S9
S21	0	S18 AND S10
S22	0	S2 AND S5
S23	0	S2 AND S6
S24	2	S2 AND (S7:S10)
S25	2	S24 NOT S14
S26	12	S4 AND S5
S27	0	S26 AND S6
S28	5	S26 AND S7
S29	3	S28 AND IC=G06K?
S30	0	S26 AND S8
S31	0	S26 AND (S9:S10)
S32	38	S5 AND S6
S33	1	S32 AND S7
S34	0	S32 AND S8
S35	0	S32 AND (S9:S10)
S36	10	S32 AND IC=G06K?
S37	0	S3 AND S6
S38	1	S3 AND (S7:S10)
S39	619	S1 AND S6
S40	0	S39 AND S8
S41	0	S39 AND S9
S42	0	S39 AND S10
S43	45	S39 AND S7
S44	6	S43 AND IC=G06K?
S45	195	S11 AND S1
S46	1	S45 AND S8
S47	1	S45 AND S8
S48	0	S47 NOT S46
		?

14/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0009751176 - Drawing available

WPI ACC NO: 2000-037340/200003

XRPX Acc No: N2000-028020

Texture edge anti - aliasing method for computer graphics

Patent Assignee: SILICON GRAPHICS INC (SILI-N)

Inventor: VAN HOOK T J

Patent Family (1 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update	
US 5982939	A	19991109	US 1995472216	A	19950607	200003	B
			US 1997971977	A	19971117		

Priority Applications (no., kind, date): US 1995472216 A 19950607; US 1997971977 A 19971117

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 5982939	A	EN	10	8	Continuation of application US 1995472216

Texture edge anti - aliasing method for computer graphics

Original Titles:

Enhancing texture edges .

Alerting Abstract ...projected texture edge. The nearest texels of a texture are identified and alpha values are **interpolated** to determine an alpha value of the mapped pixel. The new opacity value is assigned...
...An INDEPENDENT CLAIM is included for a system for reducing blurring of edges in an **image** .
...

...USE - For **anti - aliasing** of computer graphics...

...ADVANTAGE - Enables generating magnified **image** having an **anti - aliased** , single pixel wide projected texture edge

Original Publication Data by Authority

Original Abstracts:

A system and method of **antialiasing** edges of a texture that is being projected onto a polygon surface are described. The...

...adjusting the initial opacity value so as to achieve a single pixel wide projected texture **edge** . This **adjustment** is performed by determining whether the initial opacity value is less than a threshold, where...

Claims:

...surface into a texture; (2) determining an opacity value of said mapped pixel; and (3) **enhancing** an **edge** of the texture, including: (i) calculating a new opacity value of said mapped pixel to...

?

25/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0010004988 - Drawing available

WPI ACC NO: 2000-308971/200027

XRPX Acc No: N2000-231489

Image processor has transducer which uses photographed environment and observation environment information to perform image conversion of target

Patent Assignee: OLYMPUS OPTICAL CO LTD (OLYU)

Inventor: ISHII K; KOO T; OBI T; OHYAMA N; OYAMA N; TSUCHIDA M; YAMAGUCHI M

Patent Family (2 patents, 2 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
JP 2000090233	A	20000331	JP 1998254034	A	19980908	200027 B
US 7002623	B1	20060221	US 1999391943	A	19990908	200615 E

Priority Applications (no., kind, date): JP 1998254034 A 19980908

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
JP 2000090233	A	JA	11	14	

Alerting Abstract ...DESCRIPTION OF DRAWINGS - The figure shows the sketch of components of image processor...

Original Publication Data by Authority

Claims:

...in the image of the object, and which then outputs the specular reflecting component;an **interpolating** and composing unit which subjects the image data of the object taken by the image input apparatus to **interpolation** and composition processing to thereby obtain an image of the object, and which then outputs...

...using the three-dimensional form information, the specular reflecting component and the image obtained by **the** interpolation and composition processing, based on a difference between (i) photographing environment information comprising geometric...

25/3,K/2 (Item 2 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0004600623 - Drawing available

WPI ACC NO: 1988-355952/

Reduced bandwidth transmission of video signal - using cartoon as sampling template for grey-level image and reconstructing original using second order interpolation

Patent Assignee: UNIV ESSEX (UYES-N)

Inventor: HANNA E I; PEARSON D E

Patent Family (2 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
GB 2205704	A	19881214	GB 19877722	A	19870401	198850 B
GB 2205704	B	19910619	GB 19877722	A	19870401	199125 E

Priority Applications (no., kind, date): GB 19877722 A 19870401

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
GB 2205704	A	EN	62	16	

...using cartoon as sampling template for grey-level image and reconstructing original using second order interpolation

Alerting Abstract ...between the valleys and the original image is reconstructed using two dimensional second order (quadratic) **interpolation** between the sampled points...

...a continuous line drawing with lines on one pel width. Streaks produced in the final, **interpolated** image may be removed by allowing distinction between valleys and edges and then applying conditional adaptive filtering to the **interpolated** image.

Title Terms.../Index Terms/Additional Words: **INTERPOLATION**

Original Publication Data by Authority

Claims:

...between the valleys and the original image is reconstructed using two dimensional second order (quadratic) **interpolation** between the sampled points...

...a continuous line drawing with lines on one pel width. Streaks produced in the final, **interpolated** image may be removed by allowing distinction between valleys and edges and then applying conditional adaptive filtering to the **interpolated** image...

...performing a boundary extraction process on that cartoon image to yield a two-level primitive **sketch** of the original **image**, and the second component is produced by sampling the original **image** using the primitive **sketch** as a sampling template such that selected grey-level image values at points corresponding to...

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29/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0015627483 - Drawing available
WPI ACC NO: 2006-191660/200620
XRPX Acc No: N2006-165009

Input digital image data expanding and enhancing method, involves determining orientation, anisotropy, and strength of edge and determining frequency response of re-sampling filter and its footprint in input image
Patent Assignee: SILICON OPTIX INC (SILI-N)

Inventor: LACHINE V; LEE L; SMITH G L

Patent Family (2 patents, 106 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 20060039590	A1	20060223	US 2004922328	A	20040820	200620 B
WO 2006022729	A1	20060302	WO 2004US27083	A	20040820	200620 NCE

Priority Applications (no., kind, date): WO 2004US27083 A 20040820; US 2004922328 A 20040820

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 20060039590	A1	EN	18	9	
WO 2006022729	A1	EN			

National Designated States,Original: AE AG AL AM AT AU AZ BA BB BG BR BW BY BZ CA CH CN CO CR CU CZ DE DK DM DZ EC EE EG ES FI GB GD GE GH GM HR HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV MA MD MG MK MN MW MX MZ NA NI NO NZ OM PG PH PL PT RO RU SC SD SE SG SK SL SY TJ TM TN TR TT TZ UA UG US UZ VC VN YU ZA ZM ZW

Regional Designated States,Original: AT BE BG BW CH CY CZ DE DK EA EE ES FI FR GB GH GM GR HU IE IT KE LS LU MC MW MZ NA NL OA PL PT RO SD SE SI SK SL SZ TR TZ UG ZM ZW

Original Titles:

Edge adaptive image expansion and enhancement system and method...

... EDGE ADAPTIVE IMAGE EXPANSION AND ENHANCEMENT SYSTEM AND METHOD
...a mapped point is selected. Low pass filters are applied to the pixels that are down - sampled. Orientation, anisotropy and strength of an edge in the input image are determined. Frequency response...

Class Codes

International Classification (Main): G06K-009/40
International Classification (+ Attributes)
IPC + Level Value Position Status Version
G06K-0009/00 ...

Original Publication Data by Authority

Original Abstracts:

...orientation, anisotropy and variance strength, the method determines a footprint and frequency response for the interpolation of the output pixel. In a more particular implementation, the method divides the input pixel...

...the edge orientation with the nearest skew direction. This further facilitates pixels inclusion in the interpolation of the output pixel...

...orientation, anisotropy and variance strength, the method determines a footprint and frequency response for the **interpolation** of the output pixel. In a more particular implementation, the method divides the input pixel...

...the edge orientation with the nearest skew direction. This further facilitates pixel inclusion in the **interpolation** of the output pixel...

...procede permet de determiner une empreinte et une reponse de frequence en vue de l' **interpolation** du pixel de sortie. Dans un mode de realisation specifique, le procede permet de diviser...

...direction d'asymetrie la plus proche. Ceci permet de faciliter l'ajout de pixels d' **interpolation** du pixel de sortie.

Claims:

...data having an output coordinate space with certain resolution and shape, by applying adaptive edge **interpolation** to an output pixel, said method comprising: (a) obtaining the input digital image data; (b)...

29/3,K/2 (Item 2 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0010971209 - Drawing available
WPI ACC NO: 2001-594995/
Related WPI Acc No: 2000-686103
XRPX Acc No: N2001-443321

Data compressing module used in data compression and expansion system, has reduced resolution data set generator producing reduced resolution data block which is processed to generate delta values by compressor

Patent Assignee: RAYTHEON CO (RAYT)

Inventor: BROUSSARD D J; MATTHEWS R R

Patent Family (1 patents, 1 countries)

Patent Application

Number	Kind	Date	Number	Kind	Date	Update
US 6249611	B1	20010619	US 1994204965	A	19940302	200167 B
			US 2000599975	A	20000621	

Priority Applications (no., kind, date): US 1994204965 A 19940302; US 2000599975 A 20000621

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 6249611	B1	EN	12	11	Continuation of application US 1994204965

Class Codes

International Classification (Main): G06K-009/36

Original Publication Data by Authority

Original Abstracts:

...module includes a reduced resolution data set (RRDS) generator providing low pass filtering and decimation (**down sampling**) of the original data, and a one-dimensional delta pulse code modulation (DPCM) compressor performing...

...four bit decoding of the data output from the compressor module, an RRDS expander providing **interpolation** (up-sampling) of the expanded data output from the DPCM expander, and an **edge enhancement** filter for processing the data output from the RRDS expander to correct for any RRDS

Claims:

...having a compression ratio varying with the selected reduction factor and the selected compression factor; **interpolating** reduced resolution data to output recovered original data including recovering the original data in accordance with a multi-point, one or two dimensional, separable Lagrange polynomial **interpolator**; and **edge enhancement** filtering the recovered original data to output filtered original data.

29/3,K/3 (Item 3 from file: 350)

DIALOG(R)File 350:Derwent WPIX

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0010369997 - Drawing available

WPI ACC NO: 2000-686103/

Related WPI Acc No: 2001-594995

XRPX Acc No: N2000-507171

Digital data compressing apparatus encodes delta values generated by processing reduced resolution data block obtained by decimation of received original data block and delta values to output compressed data

Patent Assignee: RAYTHEON CO (RAYT)

Inventor: BROUSSARD D J; MATTHEWS R R

Patent Family (1 patents, 1 countries)

Patent		Application				
Number	Kind	Date	Number	Kind	Date	Update
US 6137922	A	20001024	US 1994204965	A	19940302	200067 B

Priority Applications (no., kind, date): US 1994204965 A 19940302

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 6137922	A	EN	14	12	

Alerting Abstract ...of compressor deviation is minimized by including the compression feedback loop to DPCM compressor. Uses **edge enhancement** filter to process RRDS expanded data samples, which increases signal detectability by correcting high frequency...

Class Codes

International Classification (Main): G06K-009/32

Original Publication Data by Authority

Original Abstracts:

...module includes a reduced resolution data set (RRDS) generator providing low pass filtering and decimation (**down sampling**) of the original data, and a one-dimensional delta pulse code modulation (DPCM) compressor performing...

...four bit decoding of the data output from the compressor module, an RRDS expander providing **interpolation** (up-sampling) of the expanded data output from the DPCM expander, and an **edge enhancement** filter for processing the data output from the RRDS expander to correct for any RRDS

33/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0009751176 - Drawing available
WPI ACC NO: 2000-037340/200003
XRPX Acc No: N2000-028020

Texture edge anti - aliasing method for computer graphics
Patent Assignee: SILICON GRAPHICS INC (SILI-N)
Inventor: VAN HOOK T J

Patent Family (1 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 5982939	A	19991109	US 1995472216	A	19950607	200003 B
			US 1997971977	A	19971117	

Priority Applications (no., kind, date): US 1995472216 A 19950607; US 1997971977 A 19971117

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 5982939	A	EN	10	8	Continuation of application US 1995472216

Texture edge anti - aliasing method for computer graphics

Original Titles:

Enhancing texture edges .

Alerting Abstract ...projected texture edge. The nearest texels of a texture are identified and alpha values are interpolated to determine an alpha value of the mapped pixel. The new opacity value is assigned...
...USE - For anti - aliasing of computer graphics...

...ADVANTAGE - Enables generating magnified image having an anti - aliased , single pixel wide projected texture edge...

Original Publication Data by Authority

Original Abstracts:

A system and method of antialiasing edges of a texture that is being projected onto a polygon surface are described. The...

...adjusting the initial opacity value so as to achieve a single pixel wide projected texture edge . This adjustment is performed by determining whether the initial opacity value is less than a threshold, where...

Claims:

...surface into a texture; (2) determining an opacity value of said mapped pixel; and (3) enhancing an edge of the texture, including: (i) calculating a new opacity value of said mapped pixel to...

36/3,K/1 (Item 1 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0014161072 - Drawing available

WPI ACC NO: 2004-346073/

XRPX Acc No: N2004-276731

Rasterized image data processing method for enhancing appearance of image involves determining binary value for each unit and applying antialiasing operation to units to generate set of antialiased values

Patent Assignee: BHATTACHARJYA A K (BHAT-I)

Inventor: BHATTACHARJYA A K

Patent Family (1 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update	
US 20040061877	A1	20040401	US 2002262733	A	20021001	200432	B

Priority Applications (no., kind, date): US 2002262733 A 20021001

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 20040061877	A1	EN	21	10	

...method for enhancing appearance of image involves determining binary value for each unit and applying antialiasing operation to units to generate set of antialiased values

Original Titles:

Fast edge reconstruction with upscaling for pulse width modulation rendering

...by comparing a gray level value of the input pixel and the array number. An antialiasing operation is applied to the units to generate a set of antialiased values which are combined to determine a gray level value of an output pixel in...

Class Codes

International Classification (Main): G06K-001/00

Original Publication Data by Authority

Original Abstracts:

A selected antialiasing technique is applied to non-labeled gray-scale or color image data by deconstructing an image into a set of binary images, applying the antialiasing method to each binary image to generate antialiased images, and combining the antialiased images to generate an output image. Computational requirements may be reduced by identifying boundaries within the input image data and generating and antialiasing localized binary images only in selected regions of the image. Antialiased image data is rendered using subpixels generated by pulse width modulation ("PWM") while preserving boundary...

...in the rasterized image that influence the gray level of a target pixel in the antialiased image data, computing for each donor pixel an occupancy rate indicating a degree to which...

Claims:

...of the corresponding input pixel to the array number of the respective array; applying an antialiasing operation to elements within each array to generate a set of antialiased values for each array; and combining antialiased values to determine a gray level value of an output pixel in an

output...

36/3,K/2 (Item 2 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0013801295 - Drawing available
WPI ACC NO: 2003-901397/200382
XRPX Acc No: N2003-719742

Image data processing method for laser printer, involves determining position value of subpixel within target pixel and another pixel, respectively based on their locations

Patent Assignee: BHATTACHARJYA A (BHAT-I); GULERYUZ O (GULE-I); HUANG J (HUAN-I); SEIKO EPSON CORP (SHIH); SHU J (SHUJ-I)

Inventor: BHATTACHARJYA A; GULERYUZ O; GULERYUZ O G; HUANG J; SHU J

Patent Family (2 patents, 2 countries)

Patent			Application			
Number	Kind	Date	Number	Kind	Date	Update
US 20030210409	A1	20031113	US 2002143617	A	20020509	200382 B
JP 2004005490	A	20040108	JP 200375975	A	20030319	200405 E

Priority Applications (no., kind, date): US 2002143617 A 20020509

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing	Notes
US 20030210409	A1	EN	26	21		
JP 2004005490	A	JA	21			

Alerting Abstract ...ADVANTAGE - The precise placement of the subpixel within the target pixel and another pixel provides **enhanced edge** rendition for printing a halftoned object represented by the pixels that are not saturated...

...DESCRIPTION OF DRAWINGS - The drawing shows a set of subpixels representing an **antialiased** object...

Class Codes

...International Classification (Main): G06K-001/00

Original Publication Data by Authority

Original Abstracts:

The appearance of **edges** in an image is **improved** through precise placement of subpixels within pixel cells that are located on or near edges ...

...density of the object is preserved. A vertical smoothing process can additionally be performed to **improve** further the appearance of **edges** in the image. The technique is particularly advantageous for printing a halftoned object represented by...

36/3,K/3 (Item 3 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0013192616 - Drawing available
WPI ACC NO: 2003-276296/200327
Related WPI Acc No: 2005-477085

XRFX Acc No: N2003-219528

Discontinuity edge overdraw method for computer graphics applications, involves overdrawing discontinuity edges of computer generated image as antialiased lines to reduce aliasing

Patent Assignee: GORTLER S J (GORT-I); HOPPE H (HOPP-I); MICROSOFT CORP (MICT); SANDER P V (SAND-I); SNYDER J M (SNYD-I)

Inventor: GORTLER S J; HOPPE H; SANDER P V; SNYDER J M

Patent Family (2 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 20020196256	A1	20021226	US 2001851701	A	20010508	200327 B
US 6919906	B2	20050719	US 2001851701	A	20010508	200547 E

Priority Applications (no., kind, date): US 2001851701 A 20010508

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing	Notes
US 20020196256	A1	EN	15	9		

...overdraw method for computer graphics applications, involves overdrawing discontinuity edges of computer generated image as antialiased lines to reduce aliasing

Alerting Abstract ...computer generated image exhibiting aliasing at its discontinuity edges. The discontinuity edges are overdrawn as **antialiased** lines to reduce aliasing....the computer generated image is reduced, by overdrawing the discontinuity edges of the image as **antialiased** lines, the crawling jaggies artifact is reduced without increasing the processing cost and time...

Class Codes

International Classification (Main): G06K-009/40 ...

Original Publication Data by Authority

Original Abstracts:

...along discontinuity edges of a rendered polygon mesh is achieved by overdrawing the edges as **antialiased** lines. The discontinuity edges are oriented consistently and blended as they approach silhouettes in the...

...a competing desire to maintain spatial sharpness by utilizing an asymmetric blending technique. To further **improve** results, the discontinuity **edges** can be sorted by depth prior to overdrawing them. These processes are effective at reducing...

...along discontinuity edges of a rendered polygon mesh is achieved by overdrawing the edges as **antialiased** lines. The discontinuity edges are oriented consistently and blended as they approach silhouettes in the...

...a competing desire to maintain spatial sharpness by utilizing an asymmetric blending technique. To further **improve** results, the discontinuity **edges** can be sorted by depth prior to overdrawing them. These processes are effective at reducing...

Claims:

...generated image, the image exhibiting aliasing at its discontinuity edges; and overdrawing the discontinuity edges as antialiased lines to reduce the aliasing...

...at its discontinuity edges; sorting the discontinuity edges prior to overdrawing; overdrawing the discontinuity edges as antialiased lines to

reduce the aliasing; identifying sharp edges prior to said rendering;
and finding...

36/3,K/4 (Item 4 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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0012903739 - Drawing available

WPI ACC NO: 2002-132544/

XRFX Acc No: N2002-100001

Color image capturing system for capturing color image of an object or scene of interest for display or storage, uses image sensor that generates output signals representative of image of object

Patent Assignee: HEWLETT-PACKARD CO (HEWP); HEWLETT-PACKARD DEV CO LP
(HEWP)

Inventor: MOTTA R J

Patent Family (7 patents, 4 countries)

Patent			Application				
Number	Kind	Date	Number	Kind	Date	Update	
GB 2354901	A	20010404	GB 200018383	A	20000726	200218	B
DE 10037701	A1	20010412	DE 10037701	A	20000802	200218	E
JP 2001119707	A	20010427	JP 2000242030	A	20000810	200218	E
DE 10037701	C2	20021121	DE 10037701	A	20000802	200278	E
US 6650795	B1	20031118	US 1999371669	A	19990810	200376	E
GB 2354901	B	20040310				200418	E
JP 3589962	B2	20041117	JP 2000242030	A	20000810	200475	E

Priority Applications (no., kind, date): US 1999371669 A 19990810

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
GB 2354901	A	EN	24	6	
JP 2001119707	A	JA	8		
JP 3589962	B2	JA	12		Previously issued patent JP 2001119707

Original Titles:

Farbbilderfassungssystem mit **Antialiasing**

...

...Farbbilderfassungssystem mit **Antialiasing**

...

...COLOR IMAGE PICKUP SYSTEM PROVIDED WITH **ANTI - ALIASING** FUNCTION...

...The color image imaging system equipped with the **anti aliasing** function

Alerting Abstract ...ADVANTAGE - Can reduce undesirable artifacts, such as fringing at the **edges**. Provides **improved** color imaging...

Class Codes

International Classification (Main): **G06K-007/00** ...

36/3,K/5 (Item 5 from file: 350)

DIALOG(R) File 350: Derwent WPIX

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0012351215 - Drawing available
WPI ACC NO: 2002-293653/200234
XRPX Acc No: N2002-229187

Grey level processing method for image data sets subjects graphical or non-saturated and saturated text images to halftone processes for reducing anti - aliasing effects.

Patent Assignee: NEXPRESS SOLUTIONS LLC (NEXP-N); EASTMAN KODAK CO (EAST)
Inventor: FEI T T; NG Y S; TAI H

Patent Family (3 patents, 3 countries)

Patent			Application			
Number	Kind	Date	Number	Kind	Date	Update
DE 10136423	A1	20020307	DE 10136423	A	20010726	200234 B
JP 2002094828	A	20020329	JP 2001204102	A	20010704	200238 E
US 7079287	B1	20060718	US 2000629696	A	20000801	200648 E

Priority Applications (no., kind, date): US 2000629696 A 20000801

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
DE 10136423	A1	DE	43	24	
JP 2002094828	A	JA	25		

...sets subjects graphical or non-saturated and saturated text images to halftone processes for reducing anti - aliasing effects.

Original Titles:

... EDGE ENHANCEMENT OF GRAY LEVEL IMAGE...

... Edge enhancement of gray level images

Alerting Abstract ...through a gamma corrector (414). Mixed halftone grey value data for pixels undergoes processing to **improve** grey level **edges** in order to **replace** specific binary pixels along an **edge** and so reduce an **anti - aliasing** effect....ADVANTAGE - A threshold value criterion test determines **whether** **improved** -edge output is sent to a printer or a display device...

Class Codes

International Classification (+ Attributes)
IPC + Level Value Position Status Version
G06K-0015/00 ...

... G06K-0009/34

Original Publication Data by Authority

Original Abstracts:

...enthalten kann, wobei diese jeweiligen Bilder Halbtongbearbeitungsvorgangen und anderen Bearbeitungsvorgangen unterzogen werden können, die die **Anti - Aliasing** -Effekte reduzieren können. Dazu werden gemischte Halbtonggrauwertdaten für Pixel einer Graustufenkantenverbesserungsverarbeitung unterzogen, um bestimmte binäre Pixel, die an einer Kante liegen, zu ersetzen, um so den **Anti - Aliasing** -Effekt zu reduzieren. Ein Signal von einem Schwellenwertkriteriumstest wird verwendet, um zu bestimmen, ob eine...

...The blended halftone gray value data for the current pixel is subjected to gray level **edge enhancement** processing to **replace** certain binary pixels adjacent an **edge** to reduce **anti - aliasing** effects. A signal

resulting from the threshold criterion test is used to determine whether there is output to the printer or display of an **edge enhanced** version of the current blended halftone pixel or a pixel value representing the blended halftone...

36/3,K/6 (Item 6 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0010851583 - Drawing available

WPI ACC NO: 2001-470361/

XRPX Acc No: N2001-349348

Darkness level modification procedure for digital image printing system, involves minimizing grey pixels spread at image edges by compressing spread grey values using grey edge compression unit

Patent Assignee: XEROX CORP (XERO)

Inventor: CLARA K Z; CUCIUREAN-ZAPAN C; IEKUIN Z; LOCE R P; ROBERT; ZHANG Y

Patent Family (2 patents, 2 countries)

Patent			Application			Update	
Number	Kind	Date	Number	Kind	Date		
JP 2001169117	A	20010622	JP 2000319877	A	20001019	200151	B
US 6606420	B1	20030812	US 1999425951	A	19991025	200355	E

Priority Applications (no., kind, date): US 1999425951 A 19991025

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
JP 2001169117	A	JA	8	7	

...edge map is obtained based on detected grey edges. The darkness and brightness are logically **adjusted** by removing and spreading grey **edges** using light and darkness controlling element (106). The grey value spread in the edges is...

Class Codes

International Classification (Main): G06K-009/40 ...

Original Publication Data by Authority

Original Abstracts:

...darkness/lightness in a digital image rendered by a printing system. An original image containing **antialiased** edges is initially thresholded and filtered to determine an edge map. With knowledge of the **edge** via the **edge** map, darkness **adjustment** is applies to the digital image. Gray-**edge** compaction is applied thereafter to **adjust** the position of the **edge**. >

36/3,K/7 (Item 7 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0009751176 - Drawing available

WPI ACC NO: 2000-037340/200003

XRPX Acc No: N2000-028020

Texture edge anti - aliasing method for computer graphics

Patent Assignee: SILICON GRAPHICS INC (SILI-N)

Inventor: VAN HOOK T J

Patent Family (1 patents, 1 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
US 5982939	A	19991109	US 1995472216	A	19950607	200003 B
			US 1997971977	A	19971117	

Priority Applications (no., kind, date): US 1995472216 A 19950607; US 1997971977 A 19971117

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
US 5982939	A	EN	10	8	Continuation of application US 1995472216

Texture edge anti - aliasing method for computer graphics

Original Titles:

Enhancing texture edges .

Alerting Abstract ...USE - For anti - aliasing of computer graphics...

...ADVANTAGE - Enables generating magnified image having an anti - aliased , single pixel wide projected texture edge...

Class Codes

International Classification (Main): G06K-009/36

Original Publication Data by Authority

Original Abstracts:

A system and method of antialiasing edges of a texture that is being projected onto a polygon surface are described. The...

...adjusting the initial opacity value so as to achieve a single pixel wide projected texture edge . This adjustment is performed by determining whether the initial opacity value is less than a threshold, where...

Claims:

...surface into a texture;(2) determining an opacity value of said mapped pixel; and(3) enhancing an edge of the texture, including:(i) calculating a new opacity value of said mapped pixel to...

36/3,K/8 (Item 8 from file: 350)

DIALOG(R)File 350:Derwent WPIX

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0009631005 - Drawing available

WPI ACC NO: 1999-582240/

XRPX Acc No: N1999-430093

Method for encoding high resolution edge position information in continuous tone image information allowing binary resolution like placement of edges in continuous tone images

Patent Assignee: XEROX CORP (XERO)

Inventor: HENDERSON T A; ZECK N W

Patent Family (3 patents, 27 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
EP 946048	A2	19990929	EP 1999301890	A	19990312	199950 B
JP 11331581	A	19991130	JP 199967910	A	19990315	200007 E

Sylvia Keys

11-Jan-07 04:19 PM

US 6020979 A 20000201 US 199846231 A 19980323 200013 E

Priority Applications (no., kind, date): US 199846231 A 19980323

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
EP 946048	A2	EN	12	10	
Regional Designated States, Original: AL AT BE CH CY DE DK ES FI FR GB GR					
IE IT LI LT LU LV MC MK NL PT RO SE SI					
JP 11331581	A	JA	7		

Alerting Abstract DESCRIPTION - It applies an **anti - aliasing** filter (100) to the text and line art regions to **replace** some **edge** pixels with gray levels having M levels and converts the image to a binary representation...

...converting each of the M levels in the art regions to a binary representations reflecting **correct edge** positions of the art regions...

...ADVANTAGE - Combines the **edge enhancing** features of high resolution BINRES with the high data content of CONRES and encodes the...

...100 The **anti - aliasing** filter

Class Codes

International Classification (Main): G06K-015/00 ...

Original Publication Data by Authority

Original Abstracts:

...continuous tone pixels, at a frequency lower than the text/line art frequency; applying an **anti - aliasing** filter to the text/line art regions, to **replace** some **edge** pixels with gray level pixels having M levels; converting the document image to a binary...

...of the M levels in the text/line art regions to a binary representation reflecting **correct edge** position of the text/line art regions, and converting the contone pixels to a binary...

...continuous tone pixels, at a frequency lower than the text/line art frequency; applying an **anti - aliasing** filter to the text/line art regions, to **replace** some **edge** pixels with gray level pixels having M levels; converting the document image to a binary...

...of the M levels in the text/line art regions to a binary representation reflecting **correct edge** position of the text/line art regions, and converting the contone pixels to a binary...

Claims:

...continuous tone pixels, at a frequency lower than said text/line art frequency; applying an **anti - aliasing** filter to said text/line art regions, to **replace** some **edge** pixels with gray level pixels having a first number of levels M; converting said document...

...of said M levels in said text/line art regions to a binary representation reflecting **correct edge** position of said text/line art regions; and converting said contone pixels to a binary...

...continuous tone pixels, at a frequency lower than said text/line art frequency; applying an **anti - aliasing** filter to said text/line art

regions, to **replace** some **edge** pixels with gray level pixels having a first number of levels M; converting said document...

...of said M levels in said text/line art regions to a binary representation reflecting **correct edge** position of said text/line art regions; and converting said contone pixels to a binary...

36/3,K/9 (Item 9 from file: 350)
DIALOG(R)File 350:Derwent WPIX
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0008146513 - Drawing available
WPI ACC NO: 1997-247624/199723
XRPX Acc No: N1997-204132

Anti - aliased character creation method for computer output device - avoids creation of stem width distortions in characters and balances stem widths while still providing all of curve smoothing and anti-jagging advantages of anti - aliasing

Patent Assignee: ADOBE SYSTEMS INC (ADOB-N)
Inventor: DOWLING T S

Patent Family (7 patents, 21 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
EP 772144	A2	19970507	EP 1996307664	A	19961023	199723 B
CA 2188512	A	19970424	CA 2188512	A	19961022	199734 E
JP 10268858	A	19981009	JP 1996316844	A	19961023	199851 E
US 5943063	A	19990824	US 1995547562	A	19951023	199941 E
EP 772144	B1	20020814	EP 1996307664	A	19961023	200255 E
DE 69622961	E	20020919	DE 69622961	A	19961023	200269 E
			EP 1996307664	A	19961023	
JP 3819976	B2	20060913	JP 1996316844	A	19961023	200660 E
Priority Applications (no., kind, date): US 1995547562 A 19951023; EP 1996307664 A 19961023						

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
EP 772144	A2	EN	30	10	
Regional Designated States,Original: AT BE CH DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE					
CA 2188512	A	EN			
JP 10268858	A	JA	76		
EP 772144	B1	EN			
Regional Designated States,Original: DE FR GB					
DE 69622961	E	DE			Application EP 1996307664
					Based on OPI patent EP 772144
JP 3819976	B2	JA	22		Previously issued patent JP 10268858

Anti - aliased character creation method for computer output device...

...balances stem widths while still providing all of curve smoothing and anti-jagging advantages of anti - aliasing

Alerting Abstract ...of greyscales (82). This results in a high resolution bitmap of the character (84). An **anti - aliased** greyscale pixel map is created at the device resolution in the client process from the...

...the character is created on the output device at the device resolution based on the **anti - aliased** greyscale pixel map...

Class Codes

(Additional/Secondary): G06K-001/00 ...

... G06K-015/02

Original Publication Data by Authority

Original Abstracts:

A method for creating **anti - aliased** characters on a computer output device includes the steps of generating a call from a...

...step of aligning the high resolution rendered stems to the coarse grid provides for an **anti - aliased** output with balanced stems. A method for rendering a character includes the steps of determining...

...A method for creating **anti - aliased** characters on a computer output device includes the steps of generating a call from a...

...step of aligning the high resolution rendered stems to the coarse grid provides for an **anti - aliased** output with balanced stems. A method for rendering a character includes the steps of determining...

Claims:

1. A method creating **anti - aliased** characters on a computer output device comprising the steps of: generating a call from a...

...a high-resolution bitmap of said character corresponding to said high-resolution grid; creating an **anti - aliased** greyscale pixel map at said device resolution in said client process from said high-resolution...

...image of said character on said output device at said device resolution based upon said **anti - aliased** greyscale pixel map...

...on the coarse grid; and where the character is to be rendered with a soft **edge**, **adjusting** the stem width by rounding it to the closest integral multiple of the high-resolution...

...A method creating **anti - aliased** characters on a computer output device comprising the steps of: generating a call from a...

...a high-resolution bitmap of the character corresponding to the high-resolution grid; creating an **anti - aliased** greyscale pixel map at the size identified by the client process from the high-resolution...

...image of the character on the output device at the device resolution based upon the **anti - aliased** greyscale pixel map.

36/3,K/10 (Item 10 from file: 350)

DIALOG(R)File 350:Derwent WPIX

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0007839501 - Drawing available

WPI ACC NO: 1996-469011/199647

XRPX Acc No: N1996-395254

Combining background and foreground image using gray masking for ink jet printer - by determining last output value of each rubber-substitute pixel specified in concerned pixel in improving edge of combined background and foreground image

Patent Assignee: XEROX CORP (XERO)

Inventor: HARRINGTON S J; KLASSEN R V; R V C

Patent Family (2 patents, 2 countries)

Patent Number	Kind	Date	Application Number	Kind	Date	Update
JP 8235367	A	19960913	JP 1995314977	A	19951204	199647 B
US 5737455	A	19980407	US 1994353763	A	19941212	199821 E

Priority Applications (no., kind, date): US 1994353763 A 19941212

Patent Details

Number	Kind	Lan	Pg	Dwg	Filing Notes
JP 8235367	A	JA	13	9	
US 5737455	A	EN	13	9	

...by determining last output value of each rubber-substitute pixel specified in concerned pixel in improving edge of combined background and foreground image

Original Titles:

ANTI - ALIASING METHOD USING GRAY MASKING TECHNIQUE...

... Antialiasing with grey masking techniques.

Alerting Abstract ...is specified based on the value of the pixel provided near a concerned pixel. The edge of the combined image is improved by determining the first output value of each rubber-substitute pixel specified in the concerned...

...ADVANTAGE - Improves edge of combined foreground and background image.

Class Codes

International Classification (Main): G06K-009/36 ...

Original Publication Data by Authority

Original Abstracts:

A method of combining antialiased edges for printing or display at a grey level reproduction device, wherein pixels have shade...

Claims:

...a final output value for the pixel of interest, whereby the combined image has an improved edge between the foreground and background images.

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